

SPEAR Lightweight Environmental Protection

Overview:

Special Operations Forces Personal Equipment Advanced Requirements (SPEAR) is the United States Special Operations Command's (USSOCOM) modernization effort for the joint (Army, Navy, and Air Force) Special Operations Forces (SOF) operator. SPEAR will focus on four areas of improvement in personal equipment from 1996 - 2005 including Lightweight Environmental Protection. SPEAR's insulation subsystem includes five

garments that provide protection to -40° Fahrenheit.

Description:

Lightweight Underwear: fabricated in treated polyester knit to wick moisture/perspiration away from the body. The undershirt has a crew neck, contoured longer tail in back and long sleeves with a thumbhole to aid in donning as well as adding additional protection to the hand/wrist area. The drawers have an elastic waistband, access fly and flat seam construction to reduce chaffing. Cost is \$30/set.

Midweight Underwear: fabricated in a stretch knit of treated polyester. The undershirt has a low bulk, fold over collar, contoured longer tail in back, and a neck to chest zipper opening to allow ventilation. The drawers have an elastic waistband, access fly, and flat seam construction to reduce chaffing. Cost is \$30/set.

Medium Weight Stretch Bib Overalls: fabricated in a stretch polyester/lycra fleece. The outer surface is a smooth, non-snag nylon knit with an insulating polyester fleece on the inside. The one-piece full bib has a two-way front zipper, mid chest inner pockets, full-length side zippers, rainbow drop seat, reinforced seat, reinforced knees, and flat seam construction to reduce bulk. Cost is \$78 each.

Pile Jacket: fabricated in a heavyweight fleece fabric. The jacket has a collar, zipper front closure, pit zips, two zippered hand warmer pockets, inner pockets and a windproof front and back yoke. Cost is \$67 each.

Wind Resistant Jacket: fabricated in heavyweight fleece wind resistant fabric. This jacket is the same basic design as the heavyweight fleece jacket with the addition of wristovers and a hood. Cost is \$98 each.

The system is designed to be individually configured based upon mission, terrain, and climatic requirements as well as personal preference. The underwear layers are designed to wick away moisture and provide warmth. The bib and fleece jacket are intended to aid the base layer in moisture vapor transmission and providing a significant insulation layer.

All layers may be worn individually or simultaneously (except jackets) and will fit comfortably with each other. The four non-wind resistant layers are intended to be worn under a windproof,

water repellent outer shell such as the Parka and Trousers, Extended Cold Weather, Camouflage (standard issue Gore-Tex® parka and trousers). The wind resistant jacket is designed to be worn as an outer layer and combines the effectiveness of the heavyweight fleece jacket and a windproof, waterproof outer shell. The system comes in six sizes (Small, Regular through X-Large Long).

Point Of Contact:

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